AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions and listings of claims in the application:

LISTING OF CLAIMS:

1. (Original): Mobile communication terminal equipment for a CDMA cellular phone system, comprising:

detection means for performing cell detection by detecting scramble codes of a visiting cell and neighboring cell;

memory means for storing a scramble code;

control means for controlling to write the scramble codes of the visiting cell and neighboring cell, detected by said detection means, into said memory means; and

measurement means for measuring detection frequencies of the scramble codes and intra-cell stay times.

2. (Original): Equipment according to claim 1, wherein said control means performs control so as to store the scramble codes in said memory means in response to user operation.

3. (Original): Equipment according to claim 1, wherein said control means performs control so as to automatically store the scramble codes in said memory means in accordance with the detection frequencies of the scramble codes.

4. (Original): Equipment according to claim 1 or 2, wherein said control means performs control so as to automatically store the scramble codes in said memory means in accordance with the intra-cell stay times.

5. (Currently amended): Equipment according to any one of claims 1 to 43, wherein said control means performs control so as to store the scramble codes in said memory means upon assigning priorities thereto in detecting operation.

6. (Original): Equipment according to claim 5, wherein said control means controls said detection means so as to perform cell detection by preferentially using the scramble codes stored in said memory means.

7. (Original): Equipment according to claim 6, wherein said control means controls said detection means so as to perform cell detection by using a plurality of scramble codes, stored in said memory means, in the descending order of priorities.

8. (Original): Equipment according to claim 7, wherein said control means controls the detection means so as to perform cell detection by using a scramble code other than the scramble codes stored in said memory means when cell detection cannot be performed by using the scramble codes stored in said memory means.

9. (Original): Equipment according to claim 8, wherein said control means controls said detection means so as to perform cell detection by preferentially using a scramble code exhibiting a high detection frequency in the past.

10. (Original): Equipment according to claim 8, wherein said control means controls said detection means so as to perform cell detection by preferentially using a scramble code exhibiting a long stay time in the past.

11. (Original): Equipment according to claim 6, wherein said detection means is configured to specify a scramble code group at the time of detection of a cell, and said control means controls said detection means so as to perform cell detection by preferentially using a scramble code which belongs to the specified scramble code group and is stored in said memory means.

12. (Original): Equipment according to claim 6, wherein said detection means is configured to specify a scramble code group at the time of detection of a cell, and said control means controls said detection means so as to perform cell detection in accordance with a priority of a scramble code which belongs to the specified scramble code group and is stored in said memory means.

13. (Currently amended): Equipment according to any one of claims 1 to ~~6~~3, wherein said detection means is configured to specify a scramble code group at the time of detection of a neighboring cell in a handover state, and said control means controls said detection means so as to perform neighboring cell detection by preferentially using a scramble code which belongs to the specified scramble code group and is stored as a scramble code of the neighboring cell in said memory means.

14. (Currently amended): Equipment according to ~~any one of claims 11 to 13~~claim 13, wherein said control means performs control so as to specify a scramble code group by preferentially using a scramble code group to which a scramble code stored in said memory means belongs, when said detection means specifies the scramble code group.

15. (Original): A control method for cell detection in mobile communication terminal equipment for a CDMA cellular phone system, comprising:

the detection step of performing cell detection by detecting scramble codes of a visiting cell and neighboring cell;

the storage step of storing the detected scramble codes of the visiting cell and neighboring cell; and

the measurement step of measuring detection frequencies of the scramble codes and intra-cell stay times.

16. (Original): A method according to claim 15, wherein the storage step comprises storing the scramble codes in memory means in response to user operation.

17. (Original): A method according to claim 15, wherein the storage step comprises automatically storing the scramble codes in the memory means in accordance with the detection frequencies of the scramble codes.

18. (Original): A method according to claim 15 or 16, wherein the storage step comprises automatically storing the scramble codes in the memory means in accordance with the intra-cell stay times.

19. (Original): A method according to any one of claims 15 to 17, wherein the storage step comprises storing the scramble codes in the memory means upon assigning priorities thereto in detecting operation.

20. (Original): A method according to claim 19, wherein the detection step comprises performing cell detection by preferentially using the scramble codes stored in the memory means.

21. (Original): A method according to claim 20, wherein the detection step comprises performing cell detection by using a plurality of scramble codes, stored in the memory means, in the descending order of priorities.

22. (Original): A method according to claim 21, wherein the detection step comprises performing cell detection by using a scramble code other than the scramble codes stored in the memory means when cell detection cannot be performed by using the scramble codes stored in the memory means.

23. (Original): A method according to claim 22, wherein the detection step comprises performing cell detection by preferentially using a scramble code exhibiting a high detection frequency in the past.

24. (Original): method according to claim 22, wherein the detection step comprises performing cell detection by preferentially using a scramble code exhibiting a long stay time in the past.

25. (Original): A method according to claim 20, wherein the detection step comprises the step of specifying a scramble code group at the time of detection of the scramble code, and the step of performing cell detection by preferentially using a scramble code which belongs to the specified scramble code group and is stored in the memory means.

26. (Currently amended): A method according to claim 21 ~~or 22~~, wherein the detection step comprises the step of specifying a scramble code group at the time of detection of the scramble code, and the step of performing cell detection in accordance with a priority of a scramble code which belongs to the specified scramble code group and is stored in the memory means.

27. (Currently amended): A method according to any one of claims 15 to ~~20~~18, wherein the detection step comprises the step of specifying a scramble code group at the time of detection of a neighboring cell in a handover state, and the step of performing neighboring cell detection by preferentially using a scramble code which belongs to the specified scramble code group and is stored as a scramble code of the neighboring cell in the memory means.

28. (Currently amended): A method according to ~~any one of claims 25 to 27~~claim 27, wherein the detection step comprises the step of specifying a scramble code group by

preferentially using a scramble code group to which a scramble code stored in the memory means belongs, when specifying the scramble code group.

29. (Original): A recording medium recording a program for a control method for cell detection in mobile communication terminal equipment for a CDMA cellular phone system, the program comprising:

the detection step of performing cell detection by detecting scramble codes of a visiting cell and neighboring cell;

the storage step of storing the detected scramble codes of the visiting cell and neighboring cell; and

the measurement step of measuring detection frequencies of the scramble codes and intra-cell stay times.

30. (Original): A medium according to claim 29, wherein the storage step comprises storing the scramble codes in the memory means in response to user operation.

31. (Original): A medium according to claim 29, wherein the storage step comprises automatically storing the scramble codes in the memory means in accordance with the detection frequencies of the scramble codes.

32. (Currently amended): A medium according to claim ~~28 or~~ 29, wherein the storage step comprises automatically storing the scramble codes in the memory means in accordance with the intra-cell stay times.

33. (Original): A medium according to any one of claims 29 to 31, wherein the storage step comprises storing the scramble codes in the memory means upon assigning priorities thereto in detecting operation.

34. (Original): A medium according to claim 33, wherein the detection step comprises performing cell detection by preferentially using the scramble codes stored in the memory means.

35. (Original): A medium according to claim 34, wherein the detection step comprises performing cell detection by using a plurality of scramble codes, stored in the memory means, in the descending order of priorities.

36. (Original): A medium according to claim 35, wherein the detection step comprises performing cell detection by using a scramble code other than the scramble codes stored in the memory means when cell detection cannot be performed by using the scramble codes stored in the memory means.

37. (Original): A medium according to claim 36, wherein the detection step comprises performing cell detection by preferentially using a scramble code exhibiting a high detection frequency in the past.

38. (Original): A medium according to claim 36, wherein the detection step comprises performing cell detection by preferentially using a scramble code exhibiting a long stay time in the past.

39. (Original): A medium according to claim 34, wherein the detection step comprises the step of specifying a scramble code group at the time of detection of the scramble code, and the step of performing cell detection by preferentially using a scramble code which belongs to the specified scramble code group and is stored in the memory means.

40. (Currently amended): A medium according to claim 35 ~~or 36~~, wherein the detection step comprises the step of specifying a scramble code group at the time of detection of the scramble code, and the step of performing cell detection in accordance with a priority of a scramble code which belongs to the specified scramble code group and is stored in the memory means.

41. (Currently amended): A medium according to any one of claims 29 to ~~34~~32, wherein the detection step comprises the step of specifying a scramble code group at the time of detection of a neighboring cell in a handover state, and the step of performing neighboring cell detection by preferentially using a scramble code which belongs to the specified scramble code group and is stored as a scramble code of the neighboring cell in the memory means.

42. (Currently amended): A medium according to ~~any one of claims 39 to 41~~claim 41, wherein the detection step comprises the step of specifying a scramble code group by preferentially using a scramble code group to which a scramble code stored in the memory means belongs, when specifying the scramble code group.

43. (New): Equipment according to claim 4, wherein said control means performs control so as to store the scramble codes in said memory means upon assigning priorities thereto in detecting operation.

44. (New): Equipment according to claim 4, wherein said detection means is configured to specify a scramble code group at the time of detection of a neighboring cell in a handover state, and said control means controls said detection means so as to perform neighboring cell detection by preferentially using a scramble code which belongs to the specified scramble code group and is stored as a scramble code of the neighboring cell in said memory means.

45. (New): Equipment according to claim 5, wherein said detection means is configured to specify a scramble code group at the time of detection of a neighboring cell in a handover state, and said control means controls said detection means so as to perform neighboring cell detection by preferentially using a scramble code which belongs to the specified scramble code group and is stored as a scramble code of the neighboring cell in said memory means.

46. (New): Equipment according to claim 11, wherein said control means performs control so as to specify a scramble code group by preferentially using a scramble code group to which a scramble code stored in said memory means belongs, when said detection means specifies the scramble code group.

47. (New): Equipment according to claim 12, wherein said control means performs control so as to specify a scramble code group by preferentially using a scramble code group to

which a scramble code stored in said memory means belongs, when said detection means specifies the scramble code group.

48. (New): A method according to claim 22, wherein the detection step comprises the step of specifying a scramble code group at the time of detection of the scramble code, and the step of performing cell detection in accordance with a priority of a scramble code which belongs to the specified scramble code group and is stored in the memory means.

49. (New): A method according to claim 19, wherein the detection step comprises the step of specifying a scramble code group at the time of detection of a neighboring cell in a handover state, and the step of performing neighboring cell detection by preferentially using a scramble code which belongs to the specified scramble code group and is stored as a scramble code of the neighboring cell in the memory means.

50. (New): A method according to claim 20, wherein the detection step comprises the step of specifying a scramble code group at the time of detection of a neighboring cell in a handover state, and the step of performing neighboring cell detection by preferentially using a scramble code which belongs to the specified scramble code group and is stored as a scramble code of the neighboring cell in the memory means.

51. (New): A method according to claim 25, wherein the detection step comprises the step of specifying a scramble code group by preferentially using a scramble code group to which a scramble code stored in the memory means belongs, when specifying the scramble code group.

52. (New): A method according to claim 26, wherein the detection step comprises the step of specifying a scramble code group by preferentially using a scramble code group to which a scramble code stored in the memory means belongs, when specifying the scramble code group.

53. (New): A medium according to claim 36, wherein the detection step comprises the step of specifying a scramble code group at the time of detection of the scramble code, and the step of performing cell detection in accordance with a priority of a scramble code which belongs to the specified scramble code group and is stored in the memory means.

54. (New): A medium according to claim 33, wherein the detection step comprises the step of specifying a scramble code group at the time of detection of a neighboring cell in a handover state, and the step of performing neighboring cell detection by preferentially using a scramble code which belongs to the specified scramble code group and is stored as a scramble code of the neighboring cell in the memory means.

55. (New): A medium according to claim 34, wherein the detection step comprises the step of specifying a scramble code group at the time of detection of a neighboring cell in a handover state, and the step of performing neighboring cell detection by preferentially using a scramble code which belongs to the specified scramble code group and is stored as a scramble code of the neighboring cell in the memory means.

56. (New): A medium according to claim 39, wherein the detection step comprises the step of specifying a scramble code group by preferentially using a scramble code group to which a scramble code stored in the memory means belongs, when specifying the scramble code group.

57. (New): A medium according to claim 40, wherein the detection step comprises the step of specifying a scramble code group by preferentially using a scramble code group to which a scramble code stored in the memory means belongs, when specifying the scramble code group.